

QUIZZ'AWAY



Martin Ohsmann is a Professor of Electrical Engineering and Information Technology at FH Aachen and a long-time contributor to Elektor Electronics. Through Quizz'away he aims at stimulating thought, speculation, construction and simulation as well as raise interesting questions.

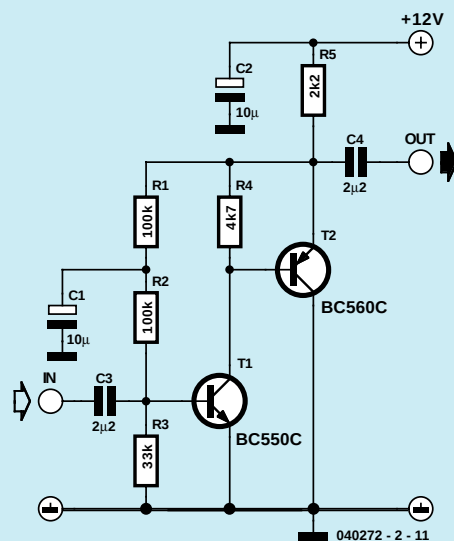
As of the September 2004 issue Quizz'away is a regular feature in Elektor Electronics. The solution to the September 2004 problem will be published in the November 2004 issue.

The problems to solve are supplied by Professor Martin Ohsmann. This month's problem is:

The two-transistor amplifier shown in the diagram has a small-signal voltage gain of about 1800, or 65 dB.

How do you explain this extremely high gain?

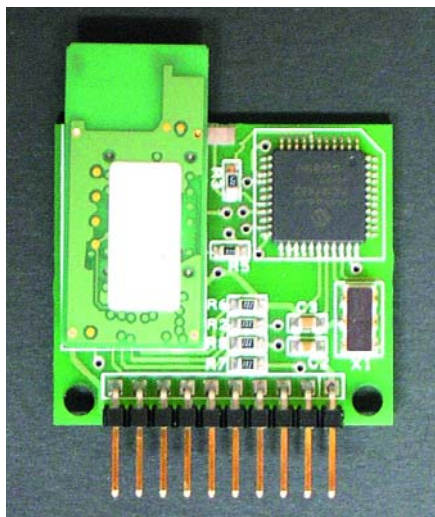
If you doubt the claim regarding the high gain, do feel free to actually build the circuit and check its behaviour. Alternatively, you may want to enter the schematic into your electronics simulation program. Why is the gain so high, considering that a classic combination of a common-emitter and common-collector circuit typically supplies a gain of up to 200?



Quizz'away and win!

Send in the best answer to this month's Quizz'away question and win this **Flexipanel Bluetooth Module** worth \$100 (www.flexipanel.com).

All answers are processed by Martin Ohsmann in co-operation with Elektor editorial staff. Results are not open to discussion or correspondence and a lucky winner is drawn in case of several correct answers.



Quizz'away conditions

Please send your answer to this month's Quizz'away problem by email, fax or letter to:

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Fax (+44) (0)1580 200616.
Email editor@elektor-electronics.co.uk,
subject: 'quizzaway 10-04'.

The closing date is 22 October 2004.

The outcome of the quiz is final. The quiz is not open to employees of Segment b.v., its business partners and/or associated publishing houses.